



Please type a plus sign (+) inside this box → ☐

02-15-02

A/R

PTO/SB/50 (02-01)

Approved for use through 01/31/2004. OMB 0651-0033  
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

## REISSUE PATENT APPLICATION TRANSMITTAL

Address to:

Assistant Commissioner for Patents  
Box Reissue  
Washington, DC 20231

Attorney Docket No.	C-2199Re
First Named Inventor	Dufner
Original Patent Number	6,024,848
Original Patent Issue Date (Month/Day/Year)	Feb. 15, 2000
Express Mail Label No.	EL914566118 US

### APPLICATION FOR REISSUE OF:

(Check applicable box)



Utility Patent



Design Patent



Plant Patent

### APPLICATION ELEMENTS (37 CFR 1.173)

1. ☒ Fee Transmittal Form (PTO/SB/56)  
(Submit an original, and a duplicate for fee processing)
2. ☐ Applicant claims small entity status. See 37 CFR 1.27.
3. ☒ Specification and Claims in double column copy of patent  
format (amended, if appropriate)
4. ☒ Drawing(s) (proposed amendments, if appropriate)
5. ☒ Reissue Oath/Declaration (original or copy)  
(37 C.F.R. § 1.175) (PTO/SB/51 or 52)
6. ☒ Power of Attorney
7. Original U.S. Patent currently assigned? ☒ Yes ☐ No  
(If Yes, check applicable box(es))  
☒ Written Consent of all Assignees (PTO/SB/53)  
☒ 37 C.F.R. § 3.73(b) Statement  
(PTO/SB/96)
8. ☐ CD-ROM or CD-R in duplicate, Computer Program (Appendix)  
or large table
9. Nucleotide and/or Amino Acid Sequence Submission  
(if applicable, all of the following are necessary)
  - a. ☐ Computer Readable Form (CFR)
  - b. Specification Sequence Listing on:
    - i. ☐ CD-ROM (2 copies) or CD-R (2 copies); or
    - ii. ☐ paper
  - c. ☐ Statements verifying identity of above copies

### ACCOMPANYING APPLICATION PARTS

10. ☒ Statement of status and support for all changes  
to the claims. See 37 CFR 1.173 (c).
11. ☒ Original U.S. Patent for surrender  
☒ Ribboned Original Patent Grant  
☐ Statement of Loss (PTO/SB/55)
12. ☐ Foreign Priority Claim (35 U.S.C. 119)  
(if applicable)
13. ☐ Information Disclosure Statement (IDS)/PTO-1449 ☐ Copies of IDS  
Citations
14. ☐ English Translation of Reissue Oath/Declaration  
(if applicable)
15. ☐ Preliminary Amendment
16. ☒ Return Receipt Postcard (MPEP 503)  
(Should be specifically itemized)
17. Other: Assignment for recording  
w/PTO-1595/dupl.

### 18. CORRESPONDENCE ADDRESS



Customer Number or Bar Code Label



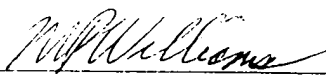
or ☐ Correspondence address below

Name	M. P. Williams		
Address	210 Main Street		
City	Manchester	State	CT
Country	USA	Zip Code	06040
	Telephone	Fax	860-649-1385
	860-649-0305		

NAME (Print/Type)	M. P. Williams	Registration No. (Attorney/Agent)	19,220
Signature	<i>MP Williams</i>	Date	2/13/02

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Assistant Commissioner for Patents, Box Reissue, Washington, DC 20231.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

REISSUE APPLICATION FEE TRANSMITTAL FORM						Docket Number (Optional) C-2199Re		
Claims as Filed - Part 1								
Claims in Patent		Number Filed in Reissue Application	(3) Number Extra	Small Entity		Other than a Small Entity		
				Rate	Fee	Rate	Fee	
(A) 14	Total Claims (37 CFR 1.16(j))	(B) 21	.... 1 =	x \$ _____ =		or	x \$ 18 = 18.00	
(C) 2	Independent claims (37 CFR 1.16(i))	(D) 6	. 4 =	x \$ _____ =			x \$ 84 = 336.00	
Basic Fee (37 CFR 1.16(h)) \$ _____							\$ 740.00	
Total Filing Fee \$ _____							OR \$ 1094.00	
Claims as Amended - Part 2								
	(1) Claims Remaining After Amendment		(2) Highest Number Previously Paid For	(3) Extra Claims Present	Small Entity		Other than a Small Entity	
					Rate	Fee	Rate	Fee
Total Claims (37 CFR 1.16(j))	...	MINUS	**	=	x \$ _____ =		x \$ _____ =	
Independent Claims (37 CFR 1.16(i))	...	MINUS	*****	=	x \$ _____ =		x \$ _____ =	
Total Additional Fee \$ _____							OR \$ _____	
<p>* If the entry in (D) is less than the entry in (C), Write "0" in column 3.</p> <p>** If the "Highest Number of Total Claims Previously Paid For" is less than 20, Write "20" in this space.</p> <p>*** After any cancellation of claims.</p> <p>**** If "A" is greater than 20, use (B - A); if "A" is 20 or less, use (B - 20).</p> <p>***** "Highest Number of Independent Claims Previously Paid For" or Number of Independent Claims in Patent (C).</p> <p><input type="checkbox"/> Applicant claims small entity status. See 37 CFR 1.27.</p> <p><input checked="" type="checkbox"/> Please charge Deposit Account No. <u>50-1307</u> in the amount of <u>\$1094.00</u> A duplicate copy of this sheet is enclosed.</p> <p><input checked="" type="checkbox"/> The Commissioner is hereby authorized to charge any additional fees under 37 CFR 1.16 or 1.17 which may be required, or credit any overpayment to Deposit Account No. <u>50-1307</u> A duplicate copy of this sheet is enclosed.</p> <p><input type="checkbox"/> A check in the amount of \$ _____ to cover the filing / additional fee is enclosed.</p> <p><input type="checkbox"/> Payment by credit card. Form PTO-2038 is attached.</p> <p style="text-align: center;"><b>WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.</b></p> <div style="display: flex; justify-content: space-between; margin-top: 20px;"> <div> <p>2/13/02</p> <p>_____ Date</p> </div> <div style="text-align: center;">   <p>_____ Signature of Applicant, Attorney or Agent of Record</p> <p>M. P. Williams _____ Typed or printed name</p> </div> </div>								



Under the Privacy Protection Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

REISSUE APPLICATION FEE TRANSMITTAL FORM						Docket Number (Optional) C-2199Re		
Claims as Filed - Part 1								
Claims in Patent		Number Filed in Reissue Application	(3) Number Extra	Small Entity Rate Fee		Other than a Small Entity Rate Fee		
(A) 14	Total Claims (37 CFR 1.16(j))	(B) 21	**** 1 =	x \$ _____ =		or	x \$ 18 = 18.00	
(C) 2	Independent claims (37 CFR 1.16(i))	(D) 6	. 4 =	x \$ _____ =			x \$ 84 = 336.00	
Basic Fee (37 CFR 1.16(h)) \$ _____							\$ 740.00	
Total Filing Fee \$ _____						OR	\$ 1094.00	
Claims as Amended - Part 2								
	(1) Claims Remaining After Amendment		(2) Highest Number Previously Paid For	(3) Extra Claims Present	Small Entity Rate Fee		Other than a Small Entity Rate Fee	
Total Claims (37 CFR 1.16(j))	...	MINUS	**	* =	x \$ _____ =		x \$ _____ =	
Independent Claims (37 CFR 1.16(i))	...	MINUS	*****	=	x \$ _____ =		x \$ _____ =	
Total Additional Fee \$ _____						OR	\$ _____	
<p>* If the entry in (D) is less than the entry in (C), Write "0" in column 3.</p> <p>** If the "Highest Number of Total Claims Previously Paid For" is less than 20, Write "20" in this space.</p> <p>*** After any cancellation of claims.</p> <p>**** If "A" is greater than 20, use (B - A); if "A" is 20 or less, use (B - 20).</p> <p>***** "Highest Number of Independent Claims Previously Paid For" or Number of Independent Claims in Patent (C).</p> <p><input type="checkbox"/> Applicant claims small entity status. See 37 CFR 1.27.</p> <p><input checked="" type="checkbox"/> Please charge Deposit Account No. <u>50-1307</u> in the amount of <u>\$1094.00</u>. A duplicate copy of this sheet is enclosed.</p> <p><input checked="" type="checkbox"/> The Commissioner is hereby authorized to charge any additional fees under 37 CFR 1.16 or 1.17 which may be required, or credit any overpayment to Deposit Account No. <u>50-1307</u>. A duplicate copy of this sheet is enclosed.</p> <p><input type="checkbox"/> A check in the amount of \$ _____ to cover the filing / additional fee is enclosed.</p> <p><input type="checkbox"/> Payment by credit card. Form PTO-2038 is attached.</p> <p><b>WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.</b></p>								
2/13/02 Date				 Signature of Applicant, Attorney or Agent of Record				
				M. P. Williams Typed or printed name				

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Reissue application of

Bryan F. Dufner et al

Docket No. C-2199Re

Patent No. 6,024,848

Date: February 13, 2002

Granted: February 15, 2000

Title: ELECTROCHEMICAL CELL WITH  
A POROUS SUPPORT PLATE

Statement of Support (37 CFR 1.173(c))

Commissioner of Patents and Trademarks  
Washington, DC 20231

Sir:

This reissue application simply adds claims 15-21.

Claims 15, 16, 20 and 21 recite that the reactant gas pressure is higher, by 2-3 psi, than the pressure of the coolant stream. Support for this is at column 8, lines 19-22.

Claims 17 and 18 recite a support plate having a partially hydrophobic bilayer between a hydrophilic substrate layer and the membrane electrode assembly, with 50% - 80% hydrophobic material and 50% - 20% hydrophilic material. Support for this is at column 7, lines 48-51.

Claim 19 recites support plate porosity of 65% - 75%. Support for this is at column 7, lines 54-59.

Respectfully submitted,



M. P. Williams

Attorney of Record

Phone: 860-649-0305

Fax: 860-649-1385

10075561-031302